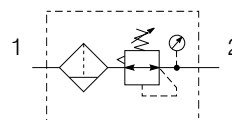


Mini Filter / Regulator P31



Symbols



- Integral 1/4 ports (BSPP & NPT)
- High efficiency 5 micron element as standard
- Excellent water removal efficiency
- Robust but lightweight aluminium construction
- Positive bayonet latch to ensure correct & safe fitting
- Secondary pressure ranges 2, 4 & 8 bar
- Secondary aspiration plus balanced poppet provides quick response and accurate pressure regulation.

Options:

P 3 1	E A			E				N		P
Thread type		Drain type		Relief		Adjustment range		Mounting		
BSPP	1	Pulse drain	B	Relieving	B	With square gauge		Plastic panel mount nut		
NPT	9	Manual drain	M	Non relieving	N	Without gauge				
Port size						2 bar *		V	2 bar	
1/4	2					4 bar		S	4 bar	
Element						8 bar **		T	8 bar	
5µ Element	E								N	
Bowl type										
Poly bowl with bowl guard										G
Metal bowl without sight glass										M

* Unit comes with 0-4 bar gauge
** Unit comes with 0-10 bar gauge

Port size	Description	Order Code	Flow dm ³ /s (scfm)	Max bar (psi)	Height mm (Inches)	Width mm (Inches)	Depth mm (Inches)
1/4"	8 bar (125 psi) Relieving - Poly bowl - Manual drain	P31EA12EGMBNT	14 (30)	10 (150)	164.1 (6.46)	40 (1.58)	64 (2.53)
1/4"	8 bar (125 psi) Relieving - Poly bowl - Pulse drain	P31EA12EGBBNT	14 (30)	10 (150)	164.1 (6.46)	40 (1.58)	64 (2.53)
1/4"	8 bar (125 psi) Relieving - Metal bowl - Manual drain	P31EA12EMMBNT	14 (30)	17 (250)	164.1 (6.46)	40 (1.58)	64 (2.53)
1/4"	8 bar (125 psi) Relieving - Metal bowl - Pulse drain	P31EA12EMBBNT	14 (30)	17 (250)	164.1 (6.46)	40 (1.58)	64 (2.53)

* flow with 10 bar (145 psig) inlet pressure, 6.3 bar (91.3 psig) set pressure and 1 bar (14.5 psig) pressure drop.

Specifications

Flow Capacity*	1/4	14 dm ³ /s (30.0 scfm)
Operating Temperature	Plastic Bowl Metal Bowl	-10°C (14°F) to 52°C (125°F) -10°C (14°F) to 65.5°C (150°F)
Max Supply Pressure	Plastic Bowl Metal Bowl	10 bar (150 psi) 17 bar (250 psi)
Standard Filtration	5 Micron	
Useful Retention	12 cm ³ (0.4 US oz.)	
Adjusting Range	0-2 bar (30 psi)	
Pressure	0-4 bar (60 psi) 0-8 bar (125 psi)	
Port Size	BSPP / NPT	1/4
Gauge Port (2 ea.)**	BSPP / NPT	1/8
Weight	0.19 kg (0.42 lbs)	

* Inlet pressure 10 bar. Secondary pressure 6.3 bar.

** Non-gauge option only.

Air quality:

Within ISO 8573-1: 1991 Class 3 (Particulates)

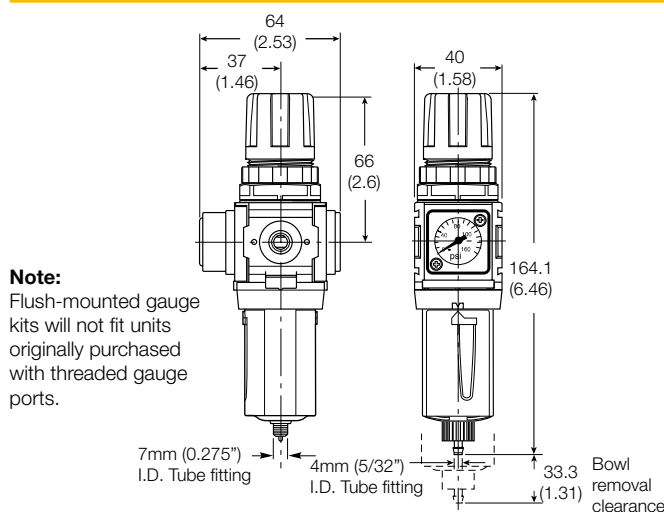
Within ISO 8573-1: 2001 Class 6 (Particulates)

Materials of Construction

Body	Aluminium	
Adjustment Knob	Acetal	
Body Cap	ABS	
Bonnet	PBT	
Bowl	Plastic Bowl Metal Bowl	Polycarbonate Aluminium
Bowl Guard	Nylon	
Filter Element	Polyethylene	
Seals	Plastic Bowl Metal Bowl	Nitrile Nitrile
Springs	Steel	
Valve Assembly	Brass / Nitrile	
Diaphragm Assembly	Brass / Nitrile	
Panel Nut	Acetal	

For best performance, regulated pressure should always be set by increasing the pressure up to the desired setting.

Dimensions

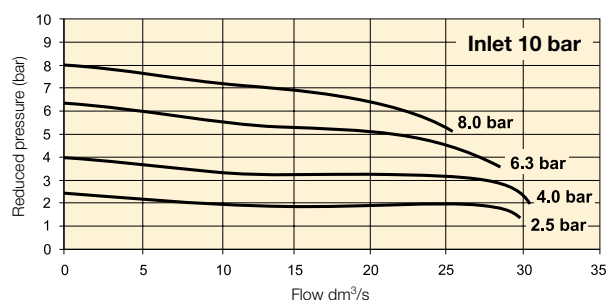


WARNING

**Product rupture can cause serious injury.
Do not connect regulator to bottled gas.
Do not exceed maximum primary pressure rating.**

Flow Charts

1/4 Filter/Regulator



Repair and Service Kits

Plastic bowl / Bowl guard manual drain	P31KA00BGM
Metal bowl / w/o sight gauge manual drain	P31KA00BMM
Plastic bowl / Bowl guard pulse drain	P31KA00BGB
Metal bowl / w/o sight gauge pulse drain	P31KA00BMB
5μ particle filter element	P31KA00ESE
Panel mount nut - Aluminium	P31KA00MM
Panel mount nut - Plastic	P31KA00MP
Angle Bracket (uses panel mount threads)	P31KA00MR
C-Bracket (fits to body)	P31KA00MW
T-Bracket with body connector	P31KA00MT
Body connector	P31KA00CB

Gauges

Square flush mount gauge

replacement for unit ordered with square gauge

0-4 bar	K4511SCR04B
0-10 bar	K4511SCR11B

40mm (1 1/2") Round 1/8" center back mount

for units ordered without square gauge

0-30 PSIG / 0-2 bar	P3D-KAB1AYN
0-58 PSIG / 0-4 bar	P3D-KAB1ALN
0-160 PSIG / 0-10 bar	P3D-KAB1ANN